

**ALTERNATIVE MILITARY PAY RAISES FOR
FISCAL YEARS 1983-1987:
THEIR EFFECTS ON ENLISTED RECRUITING,
RETENTION, AND PERSONNEL COSTS**

Prepared by

John H. Enns

The Congress of the United States

Congressional Budget Office

September 1982

PREFACE

The size and distribution of the annual military pay raise has important effects on the defense budget and on the ability of the military services to recruit and subsequently to retain personnel. This year the Congress has debated a wide variety of pay raise policies to take effect in October 1982. This report, prepared at the request of the Subcommittee on Manpower and Personnel of the Senate Committee on Armed Services and the Subcommittee on Defense of the House Committee on Appropriations, analyzes the effects of alternative pay raises for fiscal years 1983 through 1987. In accordance with CBO's mandate to provide objective analysis, the report contains no recommendations.

This report was prepared by John H. Enns of the National Security and International Affairs Division of the Congressional Budget Office, under the general supervision of Robert F. Hale and Daniel F. Huck. Joel Slackman of the National Security Division produced many of the projections of recruiting and retention while Alice Hughey, formerly with the Budget Analysis Division, provided the cost estimates for the various pay raise alternatives. Special cost estimates for the educational benefits alternative were prepared by Lorin Kusmin. Francis Pierce edited the paper and Janet Stafford prepared the report for publication.

September 1982

CONTENTS

	Page
SUMMARY	v
CHAPTER I. INTRODUCTION.....	1
Current Issues.....	1
Pay Raise Alternatives	2
CHAPTER II. EFFECTS ON RETENTION AND RECRUITING	5
Factors Other Than Pay Raises.....	5
Career Retention	6
Recruiting	11
CHAPTER III. COSTS	17
Pay Raises	17
Retirement Pay.....	20

TABLES

		Page
TABLE 1.	SUMMARY DESCRIPTION OF ALTERNATIVE PAY RAISE PLANS	3
TABLE 2.	CAREER-FORCE OBJECTIVES IN FISCAL YEAR 1983	7
TABLE 3.	ESTIMATED NUMBERS OF ENLISTED CAREER PERSONNEL WITH MORE THAN FOUR YEARS OF SERVICE UNDER ALTERNATIVE PAY POLICIES	8
TABLE 4.	ESTIMATED PERCENTAGES OF MALE RECRUITS WITHOUT PREVIOUS SERVICE ENLISTING WITH A HIGH SCHOOL DIPLOMA ..	12
TABLE 5.	INCREASES IN COMPENSATION OUTLAYS RESULTING FROM ALTERNATIVES TO THE 4-4-4 POLICY FISCAL YEARS 1983 TO 1987	18
TABLE 6.	INCREASES IN RETIREMENT COSTS UNDER ALTERNATIVES TO THE 4-4-4 POLICY, FISCAL YEARS 1983 TO 1987	19

SUMMARY

The Congress is now considering the size of the annual military pay raise scheduled to take effect on October 1, 1982; it may also set goals for pay raises beyond 1982. This report analyzes the effects of alternative pay raises on costs, retention of career personnel, and recruiting. Since at present there are no major problems in retaining or recruiting officers, the report focuses on enlisted personnel.

Many factors other than pay raises affect costs, retention, and recruiting. General economic factors play an important role. The results presented in this report are based on the assumption that unemployment will decline over the next five years. (There is, however, considerable uncertainty in any economic projection, particularly as to the future course of interest rates and thus the pace of economic recovery.) The analysis also assumes Congressional approval of service plans for a somewhat larger military, calling for increases by 1987 of about 150,000 enlisted personnel over 1982 levels, a rise of about 8 percent. Other personnel policies--such as the required number of female recruits and required proportion of recruits with previous military service--are assumed to remain similar to today's policies.

One such policy deserves special mention. The Army has indicated that in 1982 and 1983 it is limiting the size of its career force by raising standards for reenlistment. The paper assumes that the Army will continue to limit its career force over the next five years to about 44 percent of the total enlisted force, which is close to today's percentage. This limit has important implications for future years since it requires a larger number of recruits than would be the case if reenlistments were higher. A decision to raise reenlistment standards in the Army should thus be weighed in terms of the recruiting policies that will be required to support it. The Marine Corps may also limit the size of its career force, but no such limits are assumed for the other two services.

POSSIBLE PROBLEMS UNDER "4-4-4" POLICY

Under the First Concurrent Resolution on the Budget for Fiscal Year 1983, all military personnel would receive pay raises of 4 percent a year in 1983 through 1985. The Congressional Budget Office (CBO) analyzed this policy assuming annual raises comparable to civilian pay raises beyond 1985 (often called "comparability raises").

The "4-4-4" policy is, of course, not binding on the Congress, particularly in the years beyond 1983. But it would hold down pay raises and hence personnel costs; for comparison, CBO estimates that comparability pay raises would be 8.0 percent in 1983, 7.5 percent in 1984, and 7.0 percent in 1985. Because it would hold down costs, the 4-4-4 policy may be a point of departure for discussion of the military pay raise in future years.

Career personnel in all the services--those with more than four years' service--could be expected to increase under the 4-4-4 policy, but only at modest rates. This pay policy might not provide enough career personnel to meet all the services' goals. In the Navy, for example, CBO's estimates show that the 1987 career force would fall below the service objective by at least 10,000 persons, or 4 percent. Specific estimates by skill group were not made for this report, but it seems likely that larger percentage shortfalls would occur in some critical skills.

Under the 4-4-4 approach, many fewer high-quality recruits would enter the military than under a policy of comparability raises. The percentage of male recruits who are high school graduates would fall off in all the services. Completion of high school is an important indicator of recruit quality, since graduates are much more likely to complete their initial enlistment than nongraduates. The Summary Table shows recruiting results only for the Army, which faces the most severe recruiting challenge. By 1987, only about 62 percent of the Army's male recruits would hold high school diplomas--as against the current law requiring that in 1983 at least 65 percent of them have high school diplomas. This law is likely to be extended beyond 1983. The projection assumes that the Army raises reenlistment standards and limits the numbers of career personnel, thus increasing the need for recruits. But even without this assumption the Army would still fall below the 65 percent standard.

ALTERNATIVE POLICIES

Because the 4-4-4 policy may lead to difficulties in recruiting and retention, CBO was asked to analyze the effects of four other pay raise options that illustrate potential alternatives. The four are:

- o A comparability pay raise of 8 percent in 1983 and continued comparability raises in 1984 to 1987.
- o An across-the-board pay raise of 4 percent in 1983 and comparability raises in 1984 to 1987. This has been the Administration's recommended policy during the recent budget debates.

SUMMARY TABLE. SELECTED ESTIMATES OF COSTS, RECRUITING AND RETENTION

Pay Raise	Cost Increases Relative to 4-4-4 Policy (billions of dollars) ^a		Recruiting (percentage of Army male NPS recruits holding high school diplomas) ^b		Retention (thousands of DoD enlisted personnel with more than four years' service) ^c	
	1983	Total 1983-1987	1983	1987	1983	1987
Assuming Comparability Raises Beyond 1985						
4 Percent in 1983-1985	0	0	76	62	829	907
Assuming Comparability Raises Beyond 1983						
8 Percent in 1983	1.5	19.2	77	67	839	996
4 Percent in 1983	0	10.2	76	65	829	957
Targeted Raise, 1983	0.1	10.8	75	65	834	969
Educational Benefits for Recruits in Lieu of 1983-1985 Raises	0.4 ^d	11.4 ^d	77	62	829	957

^aRepresents DoD active and reserve pay and allowances for enlisted and officer personnel.

^bMinimum goal is 65 percent.

^cFigures indicate maximum career force size possible. Goal is 817,000 in 1983; goals beyond 1983 are generally not available.

^dThis option includes the accrual costs of liabilities for educational benefits that would be paid in the future. Present educational benefits would be cancelled under this option, resulting in a 1983 reduction of \$140 million in liabilities for future benefits. These liabilities do not now appear in the DoD budget, however, and so are not included in this table.

- o Pay raises for 1983 targeted toward the career enlisted force. Under this policy, the two lowest enlisted grades (E1/E2) would receive no pay increase, while the top five grades (E5 to E9) would receive a 6 percent increase. Enlisted grades E3 and E4 and all officers would receive a 4 percent raise. Beyond 1983, pay raises would return to comparability levels and be given to all personnel. This policy would continue the approach adopted last year of a targeted pay raise designed to strengthen career force retention.
- o A 4 percent pay raise in 1983 and comparability pay raises in 1984 to 1987 for all personnel except recruits in their first year of service. Pay for recruits in their first year would be frozen at 1982 levels from 1983 to 1985 in order to finance improved educational benefits. This alternative responds to those who favor educational incentives as a means of increasing recruit quality, but are concerned about the overall cost of such a program.

There are, of course, other approaches to meeting recruiting and retention goals. The Congress could, for example, limit overall pay raises while increasing bonuses or other special pays for groups the services cannot recruit or retain in adequate numbers. The Congress could also mandate changes in personnel policies other than pay. While these approaches have promise as ways to hold down costs, they are beyond the scope of this report.

Each of the pay raise alternatives examined in this report should allow the services to meet their 1983 objectives for career retention and the minimum recruit quality standards set by the Congress. Beyond 1983, each of the options to the 4-4-4 policy also should allow a reasonable chance for successful retention and recruiting. The options vary, however, in the degree to which they would achieve these purposes, as well as in their costs and associated risks. Their estimated costs and retention effects are shown in the Summary Table.

Comparability Pay Raises

The policy of giving comparability raises (including an 8 percent across-the-board raise in 1983) would be the most favorable to retention and recruiting. All services would be able to expand their career forces rapidly between 1983 and 1987, meeting overall enlisted career personnel goals and most of the goals for technical skills where retention of trained personnel is difficult. In addition, all of the services would be able to maintain high levels of recruit quality, and the Army would exceed its 65 percent standard for high school graduates in each of the next five

years. This alternative is the most expensive, however. Compared with the 4-4-4 pay raise policy, it would add \$1.5 billion to military personnel costs in 1983 and \$19.2 billion over five years.

4 Percent Raise in 1983

A 4 percent raise in 1983, followed by comparability raises thereafter, would result in better retention and recruiting than the 4-4-4 policy, though not as good as under a comparability pay raise policy. Each service could meet its career force objectives in 1983 and increase the size of its career force beyond 1983. The Army would exceed its recruit quality standard through 1986, but just meet the standard in 1987. The 4 percent raise in 1983 would leave budget authority and outlays at the level assumed in the first budget resolution. But since comparability raises would be paid in 1984 through 1987, this alternative would raise the five-year costs by \$10.2 billion over those of the 4-4-4 policy.

Targeted Pay Raise

If a 4 percent pay raise in 1983 was targeted toward senior enlisted personnel, followed by comparability raises in later years, career retention would improve, which in turn would lower the demand for recruits. But the supply of hard-to-recruit male high school graduates would decline. These two effects would result in a larger career force and about the same recruiting results as the across-the-board 4 percent pay raise alternative. The added costs of this alternative would be slightly greater than those of the 4 percent raise--\$100 million in 1983 and \$10.8 billion over five years.

Educational Benefits in Lieu of Recruit Pay Raise

Substituting educational benefits for recruit pay raises in 1983 to 1985 would leave the number of career personnel unchanged relative to the 4 percent in 1983 alternative. The increased educational benefits for recruits would allow the Army to raise somewhat its percentage of high school graduate enlistees in 1983. In later years, however, the benefits would only partially compensate for the loss in pay raises available under the other alternatives. Thus by 1987 the Army would not meet its 65 percent target because, relative to the other alternatives, initial recruit pay would have fallen by over 10 percent in real terms. Moreover, relative to the 4-4-4 policy, the educational benefits alternative would add \$450 million in 1983 costs and \$11.4 billion in total five-year costs. This would occur because the "accrual costs" of educational benefits--that is, money set aside for benefits to be paid in the future--would exceed the savings from a zero pay raise for recruits in 1983 to 1985.

Advocates of this alternative expect special advantages from improving educational benefits in lieu of a recruit pay raise. The approach would move toward the pay system in effect before the All-Volunteer Force, featuring low pay for junior personnel coupled with substantial educational benefits. Such a package might attract more college-bound youths into the services.

On the other hand, data on career plans of those who say they are college-bound suggest that few would change their minds and postpone their education until after military service. Moreover, it would be an expensive way of countering the recruiting effects of no pay raise, since the benefits would have to be substantial to offset the reluctance of youthful recruits to wait several years before receiving them. Finally, the costs and effects of this combination option are less certain than those for other pay options, since individual reactions to improved educational benefits are not easily forecast.

CONCLUSION

In 1983 each of the pay options discussed in this report would allow the services to meet or exceed their goals for retention as well as the minimum goals for recruit quality set by the Congress. For those options that limit pay raises below comparability, costs would be equal or close to those assumed for 1983 in the first budget resolution. The option providing educational benefits in lieu of recruit pay raises stands out as the most far-reaching but also the most uncertain in its effects.

Successful retention and recruiting beyond 1983 will depend heavily on future pay raise decisions. Coupled with comparability increases beyond 1983, any of the options discussed in the report should provide a reasonable chance of successful retention and recruiting. Continued limits on pay raises beyond 1983—such as the 4-4-4 policy assumed in the first budget resolution—could lead to problems. Specifically, the Army would not meet its minimum recruiting goals, and the Navy would be unable to reach its career force target for 1987. Indeed, over the longer run the Congress can ensure the viability of the All-Volunteer Force only if it maintains overall military compensation at levels that are competitive with private-sector pay.

CHAPTER I. INTRODUCTION

Over the past several years, the Congress has expressed concern as to the ability of the military services to attract and retain adequate numbers of qualified personnel, especially for the enlisted forces. This was prompted largely by the declining quality of Army recruits (as measured by education and aptitude levels) and by persistent shortfalls of some groups of experienced personnel, especially Navy petty officers. In both instances, these difficulties became more pronounced during the late 1970s—a period when the level of military pay was declining relative to civilian pay and when the job market offered more alternatives than it does today. Realizing that a continuation of the trend would threaten the survival of the All-Volunteer Force, the Congress has raised military pay and allowances by almost 30 percent over the last two years (as compared to an average pay increase of 14 percent among nonfarm production workers in the private sector). The Congress intended these raises to bring military and civilian pay into better balance.

The improvements in military pay occurred during a period of rising civilian unemployment. Between October 1980 and December 1981, the unemployment rate for all workers rose from 7.5 percent to 8.9 percent, and for males aged 16 to 19 from 16.2 percent to 20.2 percent.

Together, the higher levels of military pay and other benefits, and the deteriorating civilian labor market, have dramatically improved the services' ability to attract recruits and to build their enlisted career forces. For example, in the Army—which faces the most difficult recruiting challenge—the proportion of male recruits holding high school diplomas rose from 49 percent in fiscal year 1980 to 78 percent in fiscal year 1981, and could reach 85 percent this year. In the Navy, which has had the most difficulty in retaining career personnel, reenlistment rates among such personnel climbed from 67 percent in fiscal year 1980 to 73 percent in 1981, and could reach 76 percent this year. Both the Marine Corps and the Air Force have also experienced significant improvements.

CURRENT ISSUES

Against this backdrop of improved enlisted force recruiting and retention, the Congress is now considering the size of the annual pay raise

to take effect in October 1982. It may also decide to set goals for pay raises beyond 1982. Indeed, the First Concurrent Resolution on the Budget for Fiscal Year 1983 assumed that military pay raises would be limited to 4 percent a year in fiscal years 1983 to 1985. By comparison, CBO estimates that raises for nonfarm production workers in the private sector will average about 8 percent in 1983, 7.5 percent in 1984, and 7.0 percent in 1985. While the Congress is not committed to a 4-4-4 policy, this may be a useful point of departure in examining alternatives for the annual military pay raise.

In addition to determining the overall size of the pay raise, the Congress may choose to target the raise toward senior personnel, as was done in October 1981. This would reflect a belief that present monetary incentives in the career military service are too small to compensate for the added responsibility. Moreover, both the Navy and the Air Force have expressed their intent to increase the size of their career forces, and a targeted pay raise would facilitate this growth.

A final issue for the Congress is whether to include more educational benefits in the compensation offered to recruits. Some favor replacing the current program of educational benefits with a more generous one, and possibly financing this by restricting pay raises for recruits. H.R. 1400, the bill passed by the House Committees on Armed Services and Veterans' Affairs, provides educational benefits up to a maximum of \$21,600 for those who complete 36 months of service in shortage skills. The Congress may wish to consider such generous educational benefits for recruits as a means of drawing more college-bound youth into the military. Benefit levels of this size would represent a significant increase in compensation for recruits not eligible for the Army College Fund (VEAP with supplemental "kicker" payments) but who plan to attend college.

PAY RAISE ALTERNATIVES

This report, prepared at the request of the Subcommittee on Manpower and Personnel of the Senate Committee on Armed Services and the Subcommittee on Defense of the House Committee on Appropriations, analyzes the effects on enlisted recruitment and retention, as well as on budgetary outlays, of several alternatives to the 4-4-4 compensation policy. Since CBO's analysis suggests that this 4-4-4 policy might make it difficult to attract and retain sufficient personnel, the report considers four other alternatives that were suggested by the Subcommittees. Table 1 specifies the exact pay raises assumed under the 4-4-4 plan and the four alternatives. None of them assumes subsequent "catch-up" pay raises to

TABLE 1. SUMMARY DESCRIPTION OF ALTERNATIVE PAY RAISE PLANS

Plan	Description	Grade	Percent Increases				
			1983	1984	1985	1986	1987
"4-4-4" Raises	Adopts First Resolution and caps pay raises at 4 percent 1983 to 1985. Plan assumes comparability raises thereafter	All Grades	4.0	4.0	4.0	6.7	6.6
Full Comparability	Provides raises (1983-1987) matching those in the private sector	All Grades	8.0	7.5	7.0	6.7	6.6
4 Percent and Full Comparability	Caps raise at 4 percent in 1983, but continues with full comparability raises beyond 1983	All Grades	4.0	7.5	7.0	6.7	6.6
Targeted Raises	Targets money available for 1983 raise under First Resolution (equivalent to about 4 percent raise) toward the career force, with comparability raises thereafter	E1-E2	0.0	7.5	7.0	6.6	6.6
		E3-E4 Officers	4.0	7.5	7.0	6.7	6.6
		E5-E9	6.0	7.5	7.0	6.7	6.6
Educational Benefit and Recruit Pay Freeze ^a	Freezes pay for recruits in their first year of service at 1982 levels for 1983-1985 and substitutes certain educational benefit provisions under H.R. 1400. In 1983, all others receive 4 percent raise, with full comparability thereafter	E1-E2	0.0	0.0	0.0	6.7	6.6
		E3-E9 Officers	4.0	7.5	7.0	6.7	6.6

^aSpecifically, this alternative would provide: (1) a \$200 per month educational benefit for all persons. One month of benefits would be earned for each month of service, to a maximum of 36 months; (2) up to \$400 per month in special payments for high-quality enlistees who serve in critical skills (which this report assumes are mostly in the Army); and (3) a "cash-out" option equal to 25 percent of the maximum earned benefits. Cash-out is payable to anyone who reenlists after completion of a first enlistment and forfeits all rights to educational benefits.

compensate for limits on pay raises in 1983. Thus, the term "comparability" is limited to the size of the annual pay raise and does not mean comparability with pay received by those doing similar work in the private sector. For enlisted personnel, comparability raises are assumed to be those received by nonfarm production workers in the private sector.

This study does not exhaust all the possible approaches to setting military pay so as to meet the recruiting and retention needs of the All-Volunteer Force. As a general rule, recruiting goals could be met less expensively if compensation beyond that necessary to keep pace with entry-level private-sector pay were provided through enlistment bonuses paid in skill areas for which it is difficult to attract recruits. Similarly, reenlistment bonuses could be used to help retain needed career personnel. Thus, more extensive use of enlistment and reenlistment bonuses could be used to mitigate the adverse effects of a policy limiting pay raises below comparability (such as the 4-4-4 policy).¹

A more comprehensive approach toward compensation reform might include restructuring the military retirement system to provide more incentive to remain past the first term of service, or to continue beyond today's 20-year eligibility point. One approach would provide deferred annuities at age 60 for members who serve at least 10 years on active duty. If combined with some modest reductions in retirement pay for those who complete 20 years, it could provide a career force equal in size to the present force at less cost in the longer run. But such a restructuring would require careful study. One limitation is that it would not reduce outlays in the near term since members currently on active duty would need to be "grandfathered" under current retirement rules.²

¹For a more complete discussion of this approach, see Congressional Budget Office, **Resources for Defense: A Review of Key Issues for Fiscal Years 1982-1986** (January 1981), pp. 84-8.

²For an example of this approach, see Congressional Budget Office, **Costs of Manning the Active-Duty Military**, Staff Working Paper (May 1980), pp. 27-31.

CHAPTER II. EFFECTS ON RETENTION AND RECRUITING

This chapter analyzes the effects of alternative pay raises on retention and recruiting of enlisted personnel only. (There do not appear to be any significant problems in recruiting and retaining officers in the near future.) The chapter begins with a discussion of factors other than pay that should be taken into account, such as military personnel policies and economic conditions.

FACTORS OTHER THAN PAY RAISES

The size of the enlisted force will have a significant effect on recruiting and retention. This report assumes that the Defense Department's current five-year program will be carried out, and that the following enlisted force levels will be achieved (in thousands):

	<u>1983</u>	<u>1984</u>	<u>1985</u>	<u>1986</u>	<u>1987</u>
Army	673.6	673.0	686.0	694.0	705.0
Navy	488.0	517.8	529.8	535.6	537.0
Air Force	484.4	499.1	514.7	521.4	526.2
Marine Corps	175.5	177.2	180.1	182.0	183.3
	<u>1,821.5</u>	<u>1,867.1</u>	<u>1,910.6</u>	<u>1,933.0</u>	<u>1,951.5</u>

The Army plans to increase its enlisted force beginning in 1985, in response to requirements for the Rapid Deployment Force. The Navy's growth is a direct result of its plans to expand the size of its active fleet to 15 carrier battle groups by the end of this decade. The Air Force's growth is designed to reduce shortages in maintenance and training units as well as to support new weapons systems. Finally, the Marine Corps plans to add new units to support the Rapid Deployment Force.

Military personnel policies other than total force size also play an important part in recruiting and retention. This report assumes that all bonuses for enlistment or reenlistment, and other special pays, remain constant in real terms at 1981 levels. Except as noted, specific policies governing recruiting and retention--such as the number of female recruits, number of recruits with previous military service, and standards for reenlistment--are all assumed to remain roughly as they are now.

